

REMARKS

The Applicants do not believe that examination of the response contained, herein, will result in the introduction of new matter into the present application for invention. Therefore, the Applicants, respectfully, request that this response be examined and that the claims to the present application, kindly, be reconsidered.

The Final Office Action dated August 25, 2004 has been received and considered by the Applicants. Claims 1-9, 12, 13, and 15-22 are pending in the present application for invention. Claims 1-9, 12, 13, and 15-22 are rejected by the Final Office Action dated August 25, 2004.

The Final Office Action rejects Claims 1-9, 12, 13, and 15-22 under the provisions of 35 U.S.C. §112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. The Examiner states that the rejected claims contain the term "amount of" which is a relative term that renders the claims indefinite. The Examiner further states that the specification does not provide a standard for ascertaining the scope of the term "amount of". The Applicants respectfully disagree with these assertions contained in the Final Office Action. The Applicants would like to, respectfully, point out that rejected claims define subject matter for a playback buffer and a determination of a buffer occupancy that is indicative of an amount of data within the playback buffer. The Applicants, respectfully, assert that the recitation within the rejected claims wherein a determination is made for of a buffer occupancy that is indicative of an amount of data within the playback buffer particularly points out and distinctly claims the subject matter of the invention. The Applicants position is that the recitation within the rejected claims wherein a determination is made for of a buffer occupancy that is indicative of an amount of data within the playback buffer clearly indicates to a person skilled in the art the scope of the invention that is covered by the rejected claims.

The terminology recited by the rejected claims is defined by the specification to the present invention in clear and concise terms that provides any person skilled in the art with full knowledge of the scope of the subject matter that is covered by the rejected claims. The Applicants would like to draw the Examiner's attention to page 6 of the specification of the present invention beginning at line 12, wherein the buffer occupancy

is described as being determined during recording to control the retrieval and decoding process in the playback device. The buffer occupancy indicates an amount of data to be present in the playback buffer at the start of decoding of a corresponding frame. The playback device controls the decoding process to start when the amount indicated in the buffer occupancy is present in the playback buffer (see page 6, lines 14-20).

The Applicants would like to further draw the Examiner's attention to the description of Fig. 4 beginning on page 6 of the specification, line 26, that discusses the amount of data in the playback buffer. According to the invention decoding is postponed until the buffer level reaches the level indicated by buffer occupancy (see page 7, lines 1-3). The Applicants, respectfully, submit that the subject matter defined by the rejected claims is described by the specification in a manner that will be clearly understood by a person skilled in the art as to the scope of the subject matter covered by the rejected claims.

The Applicants would still further like to draw the Examiner's attention to the description of Fig. 3 beginning on page 12 of the specification, line 6, which discusses the control of a recording device for determining buffer occupancy. The control unit 20 is arranged for determining the buffer occupancy such that the maximum level of the buffer occupancy does not overflow the playback buffer.

The Applicants would still further like to draw the Examiner's attention to the description of Fig. 5 beginning on page 12, line 17 of the specification, which details the recording method of the invention. The buffer occupancy is determined based on the amount of compressed audio data. The Applicants, respectfully, submit that the subject matter as defined by the rejected claims is clearly described by the specification in a manner that will be understood by a person skilled in the art as and appraise a person skilled in the art as to the scope of the subject matter covered by the rejected claims. Therefore, this rejection is, respectfully, traversed.

The Office Action rejects Claims 1-9, 12, 13, and 15-22 under the provision of 35 U.S.C. §102(b) as being anticipated by U.S. Patent No. 6,353,703 issued to Tatsumi et al. (hereinafter referred to as Tatsumi et al.).

The Examiner states that Tatsumi et al. teach a method for transferring real time information, in particular audio information, comprising encoding consecutive segments

of the real time information to compressed real time data in frames on Col. 10, lines 53-64. The Applicants, respectfully point out that there is no disclosure on Col. 10, lines 53-64 of Tatsumi et al. for encoding consecutive segments of the real time information to compressed real time data in frames. Col. 10, lines 53-64 of Tatsumi et al. states that audio is captured and coded in real time which coding is controlled by a computer. The Applicants respectfully assert that there is no disclosure or suggestion of the subject matter for encoding consecutive segments of the real time information into compressed real time data in frames as recited by rejected Claim 1.

The Examiner further states that Col. 23, lines 18-28 of Tatsumi et al. teach transmitting a signal carrying the compressed real time data. The Applicants, respectfully, point out that, Col. 23, lines 18-28 of Tatsumi et al. teach outputting a signal that has been DCT processed, and quantized, not transmitting a signal carrying compressed real time data. For this rejection to stand, the output by the quantization means 104 to the inverse-quantization means 107 must be considered as being equivalent to transmitting a signal carrying the compressed real time data. As previously stated, the Examiner's position is that col. 23, lines 18-28 of Tatsumi et al. teach transmitting a signal carrying compressed real time data. The Applicants assert that there is no transmission of compressed real time data by the quantization means 104 to the inverse-quantization means 107. Tatsumi et al. teach outputting quantized DCT data to the inverse-quantization means 107 and quantized DCT data is not equivalent compressed real time data.

The Examiner further states that col. 23, lines 29-42 of Tatsumi et al. teach receiving the signal and retrieving the compressed real time data. The Applicants, respectfully, point out that col. 23, lines 29-42 of Tatsumi et al. describe the inverse-quantization means 107 that reverse the quantization process that was previously performed by the quantization means. The Applicants do not concur with the Examiner's reasoning. Initially, as previously discussed, quantized DCT data is not compressed real time data. The Applicants would like to draw the Examiner's attention to the description related to Fig. 2 of Tatsumi et al. that discusses the operation of the block diagram illustrated in Fig. 1. Tatsumi et al. on col. 24, beginning on line 31, states that the DCT processing means 103 divides the input frame into (8x8) pixel blocks and that the quantization means 104 quantizes the DCT data using a predetermined value. There is nothing within Tatsumi et al. that teaches that the DCT data is compressed real time data. Tatsumi et al. teaches that the DCD data is variable length coded however, the variable length coded data is not

received by the inverse-quantization means 107. The inverse-quantization means 107 receives quantized DCT data, not any form of compressed data as the Examiner asserts.

The Applicants further point out that the quantized DCT data that is processed by the inverse-quantization means 107 is not real time data. Fig. 2 of Tatsumi et al. clearly illustrates two separate processing paths: case (A) that is performed on the quantized DCT data as described on col. 24, lines 31-52; and case (B) that is performed on quantized DCT data as described on col. 23, lines 52-63. In case (B), it is clearly stated that the inverse-quantization means 107 inversely quantizes the quantized data that has been previously output to a previous frame picture (emphasis added). There can be no doubt that the data that the inverse-quantization means 107 inversely quantizes is not real time data but is instead data from a previous frame picture. The data output from the inverse-quantization means 107 is processed by the inverse DCT processing means 108 resulting in inverse DCT data that is used to generate a prediction picture (see col. 24, lines 53-63). The resulting prediction picture is subtracted from the input frame picture (see col. 25, lines 1-3). Note that there is no teaching within Tatsumi et al. for the data processed by the inverse-quantization means 107 that is in turn processed inverse DCT processing means 108 and the resulting inverse DCT data to be stored.

The Examiner states that Tatsumi et al. teach storing the received compressed real time data in a playback buffer on col. 87, lines 32-52. The Applicants, respectfully, point out that the Examiner is attempting to apply the description related to Fig. 50 within Tatsumi et al. in combination with elements previously described relating to Figures 1 and 2 of Tatsumi et al.; however, the Examiner has not provided any coherent rationale for applying the subject matter taught by Tatsumi et al. at col. 87, lines 32-52 with the subject matter previously discussed relating to Figures 1 and 2 of Tatsumi et al. The description related to Fig. 50 within Tatsumi et al. at col. 87, lines 32-52 discusses a coding-loading evaluating unit that operates on coded audio data; however, the Examiner has failed to indicate how the coded data discussed in Fig. 50 and col. 87, lines 32-52 of Tatsumi et al. relates to the previously discussed data processed by the inverse-quantization means 107 that is in turn processed by the inverse DCT processing means 108 resulting in the inverse DCT data. The Applicants, respectfully point out that the recited element within the rejected claims for "storing the received compressed real time data in a playback buffer" specifically relates to data that was retrieved for the received signal. The description contained on col. 87, lines 32-52 of Tatsumi et al. discusses coded audio data but it is

not the data processed by the inverse-quantization means 107 that is in turn processed by the inverse DCT processing means 108 resulting in the inverse DCT data that was applied to the previously discussed elements. The Examiner has not given any indication of how the data that is being discussed on col. 87, lines 32-52 of Tatsumi et al. can possibly be considered as the same, or at least as being equivalent to, as the data being discussed on columns 23 and 24 of Tatsumi et al. The Applicants respectfully assert that the coded audio data discussed on col. 87, lines 32-52 of Tatsumi et al. is the run length coded audio and not the predictive data that was applied against the previously discussed elements to rejected Claims 1. Therefore, the Final Office action is mixing and matching various data paths taught by Tatsumi et al. in an attempt to arrive at the present invention as defined by the rejected claims.

The Applicants would like to draw the Examiner's attention to the MPEP at §2131 that quotes the courts opinion in *Verdegaal Bros. v. Union Oil Co. of California*, 814 F.2d 628, 631, 2 USPQ2d 1051, 1053 (Fed. Cir. 1987) stating that a "claim is anticipated only if each and every element as set forth in the claim is found, either expressly or inherently described, in a single prior art reference." The Applicants, respectfully, assert that the rejection contained in the August 25, 2004 Final Office Action does not set forth each and every element within the rejected claims because, simply put, the rejected claims require processing to be performed on the same data and the rejection cites different data streams; which different data streams results in the rejection not finding all the elements of the rejected claims. The MPEP at §2131 further quotes the courts opinion in *Richardson v. Suzuki Motor Co.*, 868 F.2d 1226, 1236, 9 USPQ2d 1913, 1920 (Fed. Cir. 1989) in stating that the "identical invention must be shown in as complete detail as is contained in the ... claim." The Applicants assert, as previously stated that the rejection contained in the Final Office Action does not address the present invention as claimed but instead cites processing of different portions of data as taught by Tatsumi et al. against the processing of a signal data path as required by the rejected claims. The MPEP at §2131 further quotes the courts opinion in *In re Bond*, 910 F.2d 831, 15 USPQ2d 1566 (Fed. Cir. 1990) stating that the "elements must be arranged as required by the claim, but this is not an *ipsisimilis verbis* test, i.e., identity of terminology is not required." The Applicants are not requesting that the Examiner apply a litmus test to the terminology employed, the Applicants simply request that the Examiner arrange the elements as defined by the rejected claims as required by the MPEP and case law. This has not been done by the rejection contained in the Final Office Action.

The Examiner states that Tatsumi et al. teach decoding the compressed real time data from the playback buffer at col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67. The Applicants respectfully assert that column 87, 88 and 89 of Tatsumi et al. are actually discussing the coding of audio and video signals and not decoding of compressed data. The Applicants respectfully point out that Tatsumi et al. at col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67 discuss a coding-loading evaluating unit that operates on coded audio data. Furthermore, as previously stated, the Examiner has not shown any correlation between the coded data discussed in the description related to Fig. 50 on col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67 of Tatsumi et al. to the previously discussed data processed by the inverse-quantization means 107 that is in turn processed by the inverse DCT processing means 108 resulting in the inverse DCT data that was applied against previously discussed elements.

The Examiner states that Tatsumi et al. teach determining, before transmitting, a buffer occupancy for at least one frame, which buffer occupancy is indicative of an amount of compressed real time data to be present in the playback buffer at the start of decoding said frame at col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67. The Applicants, respectfully, assert that there is no teaching or suggestion for determining, before transmitting, a buffer occupancy for at least one frame within Tatsumi et al. Initially, as discussed above, the data which the Examiner previously applied to the step of transmitting is not the same data that is being discussed by Tatsumi et al. at col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67, therefore, the elements as recited by the rejected claims are not met by the rejection contained in the Final Office Action. Furthermore, col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67 of Tatsumi et al. do not teach or suggest determining, before transmitting, a buffer occupancy for at least one frame, which buffer occupancy is indicative of an amount of compressed real time data to be present in the playback buffer at the start of decoding of a frame as asserted by the Final Office Action. Tatsumi et al. teach that the "signals are stacked in the audio buffering unit 2203 which rewrites the pro-audio buffer size based on the current audio buffer size (see col. 88, lines 39-41). Tatsumi et al. does not disclose or suggest any determination of an amount indicative of the compressed data in a playback buffer prior decoding. Moreover, Tatsumi et al. does not disclose or suggest determining before transmitting an amount of compressed real time data to be present in the playback buffer at the start of decoding. The Applicants respectfully point out that the Examiner has not indicated which elements within columns 87 and 88 of Tatsumi et al. to which

the Examiner is referring. The Applicants have replied to this rejection assuming that the Examiner is referring to the audio buffering discussion; however, coding of video signals is also discussed on Columns 87 and 88 of Tatsumi et al. The Applicants would like to point out that the basic premise being discussed on column 87 and 88 of Tatsumi et al. is that the coding-loading evaluating unit 2253 uses the predicted audio buffer size to determine if video signal are to be input into the video coding unit 2207 (see col. 88, lines 15-17); however there is no disclosure or suggestion for determining, before transmitting, a buffer occupancy for at least one frame, which buffer occupancy is indicative of an amount of compressed real time data to be present in the playback buffer at the start of decoding of a frame as recited by rejected Claim 1.

The Examiner states that by Tatsumi et al. at col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67, teach the transferring the buffer occupancy via the signal and controlling of the retrieving and/or the decoding in dependence on said transferred buffer occupancy as recited by the rejected claims. The Applicants respectfully point out that column 87, 88 and 89 of Tatsumi et al. are actually discussing the coding of audio and video signals. The Applicants request that the Examiner indicate any decoding that takes place within column 87, 88 and 89 of Tatsumi et al. In view of the above comment, this rejection is, respectfully, traversed.

Regarding Claim 2, the Examiner's position is that Tatsumi et al. at col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67, teach a signal that carries real time information, in particular audio information, which real time information is encoded to compressed real time data in frames relating to consecutive segments of the real time information, wherein the signal comprises a buffer occupancy for at least one frame, which buffer occupancy is indicative of an amount of compressed real time data to be present in a playback buffer at the start of decoding said frame. The Applicants request that the Examiner indicate any decoding that is discussed in col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67 of Tatsumi et al. The only items discussed in column 87, 88 and 89 of Tatsumi et al., as previously stated, are coding and using the audio buffer size to determine when video coding is to take place. The Applicants respectfully, submit that the citation of Tatsumi et al. contained within the Final Office Action is not on point with the subject matter as defined by the rejected claims to the present invention. Accordingly, this rejection is, respectfully, traversed.

The Examiner states that Tatsumi et al. teach a method for recording audio information on a record carrier, the method comprising encoding consecutive segments of the audio

information to compressed audio data in frames at col. 10, lines 53-64. The Applicants, respectfully point out that there is no disclosure on Col. 10, lines 53-64 of Tatsumi et al. for encoding consecutive segments of the real time information to compressed real time data in frames. Col. 10, lines 53-64 of Tatsumi et al. states that audio is captured and coded in real time which coding is controlled by a computer. The Applicants respectfully assert that there is no disclosure or suggestion of the subject matter for encoding consecutive segments of the real time information to compressed real time data in frames as recited by rejected Claim 3.

The Examiner further states that Tatsumi et al. at col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67 teach recording the compressed audio data, and determining a buffer occupancy for at least one frame, which buffer occupancy is indicative of an amount of compressed audio data to be present in a playback buffer at the start of decoding a frame. The Applicants respectfully request that the Examiner indicate where within Tatsumi et al. there exist any recording of the compressed audio data. It should be noted that while many of the claims of Tatsumi et al. recite within the preamble a recording medium for recording an audio coding program, there is no actual recording on a recording medium that is taught or otherwise suggested by Tatsumi et al. except for storing the audio coding program taught, therein. Thus, Tatsumi et al. teach that the audio coding program taught, therein, can be stored on a computer readable medium. There nothing within the disclosure of Tatsumi et al. that teaches recording of compressed audio data. The Applicants again assert that decoding is not discussed on column 87, 88 or 89 and that only encoding using the audio buffer as a test for determining when to encode video signals.

The Examiner further states that Tatsumi et al. at col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67 teach recording the buffer occupancy on the record carrier. The Applicants respectfully point out that there is no recording the of buffer occupancy on the record carrier taught or suggested by Tatsumi et al. The Applicants assert that Tatsumi et al. teach data from a video camera that is processed. It should be noted that while some of the claims of Tatsumi et al. recite within the preamble a recording medium for recording the audio coding program, there is no actual recording on the recording medium that takes places during or as a result of processing taught, or otherwise suggested, by Tatsumi et al. The Applicants position is that using a recording medium for storing the audio coding program can not be read on the recording of data that is processed by an audio coding program. There is no teaching or suggestion within Tatsumi

et al. for recording the buffer occupancy (or the equivalent thereof) within the video camera or any other recording medium. Accordingly, this rejection is respectfully traversed.

Regarding Claim 4, the Examiner further states that Tatsumi et al. at col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67 teach the buffer occupancy is indicative of the amount of compressed audio data to be present in the playback buffer at the start of decoding the frame before the compressed audio data relating to said frame is removed from the buffer. As previously discussed column 87, 88 and 89 of Tatsumi et al. teach encoding and do not mention or otherwise teach decoding. Accordingly, this rejection is respectfully traversed.

Regarding Claim 5, the Examiner states that Tatsumi et al. at col. 87, lines 32-52 and col. 87, line 62-col. 88, line 67 teach determining the buffer occupancy comprises the step of determining an amount of compressed audio data in a recording buffer before or after encoding the frame. The Applicants request that the Examiner indicate where within Tatsumi et al. there exists a recording buffer. The Applicants assert that Tatsumi et al. do not teach or suggest a recording buffer. It should be noted that there are claims within Tatsumi et al. that recite with the preamble a recording medium for recording an audio coding program; however, there is no actual recording on a recording medium that is taught or otherwise suggested by Tatsumi et al. except for storing the audio coding program taught, therein. Accordingly, this rejection is respectfully traversed.

Regarding Claim 6, the subject defined is a recording device for recording audio information on a record carrier. The Applicants, respectfully point out that Tatsumi et al. do not teach or otherwise suggest recording on a record carrier. Claim 6 defines subject matter for a compression element that is configured to encode consecutive segments of the audio information to compressed audio data in frames, and a recording element that is configured to record the compressed audio data on the record carrier. There is no disclosure or suggestion within Tatsumi et al. for recording compressed audio data on the record carrier. Furthermore there is no disclosure or suggestion within Tatsumi et al. for an occupancy determinator that is configured to determine a buffer occupancy for at least one frame, which buffer occupancy is indicative of an amount of compressed audio data to be present in a playback buffer at the start of decoding the frame, wherein the recording element is configured to record the buffer occupancy on the record carrier, because, simply put, there is no recording or placing of data on a record carrier in any way discussed within Tatsumi et al. As previously discussed, there are claims of Tatsumi et al.

that recite within the preamble a recording medium for recording an audio coding program; however, these claims simply pertain to a recitation of a computer readable medium. There is no recording of compressed data, or any data that has been processed, on a recording medium taught or otherwise suggested by Tatsumi et al. Accordingly, this rejection is respectfully traversed.

Regarding Claim 7, Tatsumi et al. does not teach or suggest a recording buffer, nor the occupancy determinator being configured to determine the buffer occupancy in dependence on an amount of compressed audio data present in the recording buffer before or after encoding the frame. There is no recording buffer discussed within Tatsumi et al. Note that some claims of Tatsumi et al. recite a preamble for a recording medium for recording an audio coding program. The recording medium mentioned by Tatsumi et al. is only disclosed as a computer readable medium and there is no actual recording on a recording medium that is taught or otherwise suggested by Tatsumi et al. Accordingly, this rejection is respectfully traversed.

Regarding Claim 8; which defines subject matter for a record carrier carrying audio information, which audio information is encoded to compressed audio data in frames relating to consecutive segments of the audio information, comprising a buffer occupancy for at least one frame, which buffer occupancy is indicative of an amount of compressed audio data to be present in a playback buffer at the start of decoding the frame. The Final Office Action has failed to show any record carrier within Tatsumi et al. that contains a buffer occupancy for at least one frame, which buffer occupancy is indicative of an amount of compressed audio data to be present in a playback buffer at the start of decoding the frame. Accordingly, this rejection is respectfully traversed.

Regarding Claim 9, which defines subject matter for a record carrier having a buffer occupancy indicative of the amount of compressed audio data to be present in the playback buffer at the start of decoding said frame before the compressed audio data relating to said frame is removed from the playback buffer. The Final Office Action has failed to show any record carrier within Tatsumi et al. having a buffer occupancy that is indicative of the amount of compressed audio data to be present in the playback buffer at any time. The Final Office Action has failed to show any record carrier within Tatsumi et al. that relates to decoding in any manner whatsoever. The Final Office Action has failed to show any record carrier within Tatsumi et al. that discusses the compressed audio data relating to a frame being removed from the playback buffer. Accordingly, this rejection is respectfully traversed.

Regarding Claim 12, the Final office Action has not showed where any of the elements defined by reject Claim 12 are found with the cited reference Tatsumi et al. The Final office Action has not showed any playback device for retrieving audio information from a record carrier having a reader configured to retrieve the compressed audio data from the record carrier within Tatsumi et al. Neither has the Final office Action showed where Tatsumi et al. teach a playback device or a de-compression element that is configured to decode frames of compressed audio data from the playback buffer to consecutive segments of the audio information. There is no an occupancy reader configured to retrieve the buffer occupancy for at least one frame from a record carrier within Tatsumi et al. There is no disclosure or suggestion for a controller configured to control at least one of the reader and the de-compression element in dependence on-said the retrieved buffer occupancy within Tatsumi et al. Accordingly, this rejection is respectfully traversed.

Regarding Claim 13, as previously stated there is no decoding taught within Tatsumi et al. Claim 13 defines subject matter for a playback device, wherein the controller is configured to control the de-compression element to start decoding a frame when the amount of compressed audio data in the playback buffer substantially corresponds to the buffer occupancy. The Final Office Action has not showed where a controller is configured to control the de-compression much less a controller is configured to control the de-compression element to start decoding a frame when the amount of compressed audio data in the playback buffer substantially corresponds to the buffer occupancy as defined by rejected Claim 12. Accordingly, this rejection is respectfully traversed.

Regarding Claim 15, the Final Office Action has not showed where a record carrier exists within Tatsumi et al. having frame information located in a header area associated with the frame, and which frame information includes the buffer occupancy. Accordingly, this rejection is respectfully traversed.

Regarding Claim 16, the Final Office Action has not showed where a record carrier exists within Tatsumi et al. having frame information for at least one frame, which frame information is located in a header area associated with said frame, and which frame information comprises the buffer occupancy. Accordingly, this rejection is respectfully traversed.

Regarding Claim 17, the Final Office Action has not showed where a record carrier exists within Tatsumi et al. having a pause area between two audio items, in which pause

area a series of buffer occupancies is indicative for a change in transfer speed from a first transfer speed at the end of the preceding audio item to a second transfer speed at the start of the following audio item. Accordingly, this rejection is respectfully traversed.

Regarding Claim 18, the Final Office Action has not showed where a record carrier exists within Tatsumi et al. having a pause area between two audio items, in which pause area a series of buffer occupancies is indicative for a change in transfer speed from a first transfer speed at the end of the preceding audio item to a second transfer speed at the start of the following audio item. Accordingly, this rejection is respectfully traversed.

Regarding Claim 19, the Final Office Action has not showed where a record carrier exists within Tatsumi et al. having a pause area with a series of buffer occupancies indicative for a change in transfer speed from a first transfer speed at the end of the preceding audio item to a second transfer speed at the start of the following audio item. Accordingly, this rejection is respectfully traversed.

Regarding Claim 19, the Final Office Action has not showed where a record carrier exists within Tatsumi et al. having a pause area between two audio items, in which pause area a series of buffer occupancies is indicative for a change in transfer speed from a first transfer speed at the end of the preceding audio item to a second transfer speed at the start of the following audio item. Accordingly, this rejection is respectfully traversed.

Regarding Claim 21, the Final Office Action has not showed where a playback device exists within Tatsumi et al. having a controller configured to control the reader to adapt a speed of retrieving the compressed audio data from the record carrier in dependence on a difference between the buffer occupancy and the actual amount of compressed audio data present in the playback buffer at the start of decoding the frame. As previously discussed Tatsumi et al. pertains to encoding not decoding. Accordingly, this rejection is respectfully traversed.

Regarding Claim 21, the Final Office Action has not showed where a playback device exists within Tatsumi et al. having a controller configured to control the reader to adapt a speed of retrieving the compressed audio data from the record carrier in dependence on a difference between the buffer occupancy and the actual amount of compressed audio data present in the playback buffer at the start of decoding the frame. As previously discussed Tatsumi et al. pertains to encoding not decoding. Accordingly, this rejection is respectfully traversed.

The Applicants respectfully point out that the claims of the present invention define the

buffer occupancy to be indicative of an amount of compressed real time data that should be present at a receiver buffer at the start of decoding of the received data. Tatsumi et al. do not teach decoding and Tatsumi et al. do not teach determining an amount of compressed real time data that should be present in a receiver buffer, or communicating this amount to a receiver.

The Final Office Action asserts that Tatsumi et al. teach determining and/or transmitting a buffer occupancy that is indicative of an amount of compressed real time data that should be present at a receiver buffer at the start of decoding of the received data. The Applicants, respectfully disagree with this characterization of Tatsumi et al. Tatsumi et al. teach an encoding system that is configured to selectively drop video frames when the time required to encode the frames will interfere with the encoding corresponding audio information. The Applicants respectfully draw the Examiner's attention Fig. 50 of Tatsumi et al. The coding-load evaluation unit 2144 of Tatsumi et al. determines a rate at which the audio coding unit 2142 is able to compress audio information from a buffer 2103. If the rate is below a given threshold 2110, the coding-load evaluation unit 2144 decouples the output of the video capture unit 2106 from the video coding unit 2107, via the illustrated switch in the evaluation unit 2144. Tatsumi et al. do not address the receipt of the encoded information, the determination of a buffer occupancy at a receiver that is necessary to avoid underflow nor overflow. Thus, Tatsumi et al. do not teach determining a buffer occupancy that is indicative of an amount of compressed data at a receiver buffer, as specifically defined by the claims of the present invention. Tatsumi et al. do not teach the inclusion of the determined buffer occupancy with the encoded data being communicated to the receiver.

In view of the foregoing discussion, the Applicant, respectfully submit that Tatsumi et al. do not teach the recited elements of the claimed invention. Accordingly, it is respectfully requested that the rejection of the foregoing claims be rescinded and that the claims be allowed to issue as letters patent.

Applicant is not aware of any additional patents, publications, or other information not previously submitted to the Patent and Trademark Office which would be required under 37 C.F.R. 1.99.

In view of the foregoing amendment and remarks, the Applicant believes that the present application is in condition for allowance, with such allowance being, respectfully, requested.

Respectfully submitted,

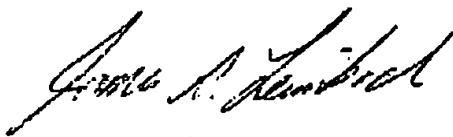
By 

James D. Leimbach, Reg. 34,374
Patent Attorney (585) 381-9983

CERTIFICATE OF TRANSMISSION

I hereby certify that this correspondence
is being transmitted on this date via
facsimile transmission to (703) 872-9306 AND addressed to:
COMMISSIONER OF PATENTS
P.O. Box 1450
Alexandria, VA 22313-1450

Date of Transmission: October 8, 2004



(Signature)